Amendments to the Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

Claims 1 – 30 (cancelled)

Claim 31 (currently amended): A method for the *in vivo* detection of fibrin in a patient, said method comprising the steps of:

administering to said patient an effective amount of a detectable reagent comprising discrete particles dispersed in a pharmaceutically or veterinarily acceptable carrier, diluent, excipient, adjuvant or any combination thereof, wherein said particles comprise a detectable marker encased in at least two layers of carbon, wherein the outer surface of said particles comprises graphitic carbon, ~~which allows for a stable chemical association with an aqueous medium~~ and wherein upon administration of said reagent said particles are dispersed in the aqueous medium and form a stable colloid;

binding said particles to said fibrin, wherein said particles bind directly to said fibrin; and

detecting the presence of said detectable marker in said patient.

Claim 32. (canceled)

Claim 33. (previously amended) The method according to claim 31, wherein the outer surface of each of said particles is hydrophilic.

Claim 34. (previously presented) The method according to claim 31, wherein the carrier is an aqueous solution.

Claim 35. (previously presented) The method according to claim 34, wherein the aqueous solution is 5% glucose in water.

Claims 36 – 60 (cancelled)

Claim 61. (previously presented) The method according to claim 31, wherein a surface of said particles is coated with a surfactant coating that increases the binding efficiency of said coated particles with fibrin relative to uncoated particles.

Claims 62 - 63 (cancelled)

Claim 64. (original) The method of claim 31 wherein said particles form a nanocolloid upon administration of said detectable reagent.

Claims 65 – 67 (cancelled)

Claim 68. (previously presented) The method of claim 61, wherein said surfactant coating comprises $C_{16}EO_6$.

Claims 69 – 70 (cancelled)

Claim 71. (previously presented) The method according to claim 31 wherein the outer surface of each of said particles is hydrolyzed graphite.

Claim 72. (cancelled)

Claims 73 – 79 (cancelled)

Claim 80. (currently amended) A method for the *in vivo* detection of fibrin present in the bloodstream of a subject, said method comprising the steps of:

administering to the bloodstream of said subject an effective amount of a detectable reagent comprising discrete particles dispersed in a pharmaceutically or veterinarily acceptable carrier, diluent, excipient, adjuvant or any combination thereof, wherein said particles comprise a detectable marker encased in ~~at least two~~ about 2 to 20 layers of carbon, wherein the outer surface of said particles comprises graphitic carbon ~~which allows for a stable chemical association with an aqueous medium~~ and wherein upon administration of said reagent said particles are dispersed in the aqueous medium and form a stable colloid;

binding said particles to said fibrin, wherein said particles bind directly to said fibrin; and

detecting the presence of said detectable marker in said bloodstream of said subject.

Claim 81. (currently amended) A method for the *in vivo* detection of fibrin present in a blood vessel of a subject, said method comprising the steps of:

administering into said blood vessel of the subject an effective amount of a detectable reagent comprising discrete particles

dispersed in a pharmaceutically or veterinarily acceptable carrier, diluent, excipient, adjuvant or any combination thereof, wherein said particles comprise a detectable marker encased in ~~at least two~~ about 2 to 20 layers of carbon, wherein the outer surface of said particles comprises graphitic carbon ~~which allows for a stable chemical association with an aqueous medium~~ and wherein upon administration of said reagent said particles are dispersed in the aqueous medium and form a stable colloid;

binding said particles to said fibrin, wherein said particles bind directly to said fibrin; and

detecting the presence of said detectable marker in said blood vessel of said subject.

82. (currently amended) A method for the *in vivo* detection of fibrin, said method comprising the steps of:

administering to said patient an effective amount of a detectable reagent comprising discrete diagnostic particles dispersed in a pharmaceutically or veterinarily acceptable carrier, diluent, excipient, adjuvant or any combination thereof, wherein said diagnostic particles comprise a detectable marker encased in at least two layers of carbon, ~~wherein the outer surface of said particles allows for a stable chemical association with an aqueous medium,~~ wherein upon administration of said reagent said particles are dispersed in the aqueous medium and form a stable colloid and wherein said particles are made by heating a carbon crucible having deposited thereon a detectable marker to a temperature in the range of about 2250° C to about 3000° C in an inert gas and in

a sealed container, thereby generating particles suspended in said inert gas, precipitating said particles suspended in said inert gas to form said diagnostic particles;

binding said diagnostic particles to said fibrin, wherein said particles bind directly to said fibrin; and

detecting the presence of said detectable marker in said patient.

83. (previously presented) The method of claim 82 wherein said particles suspended in said inert gas are precipitated using an electrostatic precipitator.

84. (new) The method of claim 31 wherein said graphitic carbon outer surface of said particles directly binds to said fibrin.

85. (new) The method of claim 31 wherein said particles selectively bind to said fibrin.